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BMP Advisory Committee Meeting Notes

2001 - 2004

This document contains notes from Forestry Best Management Practices (BMP) Advisory Committee meetings held from 2001 to 2004. Additional information on the Forestry BMP Advisory Committee, including more recent meeting agendas and notes, is available at:
<http://dnr.wi.gov/org/land/forestry/Usesof/bmp/advisory/>

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draft

BMP Advisory Committee Meeting Notes from December 17, 2001

Committee Members Present: Miles Benson, Governor's Council on Forestry; Ed Brandis, Timber Producers Association; Matt Dallman, The Nature Conservancy; John Grosman (for Don Last), 1000 Friends of Wisconsin; Earl Gustafson, Wis. Paper Council; Wayne Hamann (for Denny Brown), Wis. Professional Loggers Association; Dan Kretz, Lake States Lumber Association; Nancy Livingston, Wis. Woodland Owners Association; Mary Platner, Wis. Association of Lakes; Mike Prouty, US Forest Service; Bob Rogers, Society of American Foresters; Fred Souba, Stora Enso; Dave Stoiber, International Paper; and Rich Wiest, US Forest Service.

Staff Present: Jim Baumann, DNR; John DuPlissis, UWEX; Dale Gasser, DNR; Jolene Willert, DNR; and Darrell Zastrow, DNR.

Others Present: Gene Francisco, Chief State Forester

Introductions and Opening Remarks

Gene Francisco started the meeting by having everyone introduce themselves and whom they are representing. In his remarks, Gene noted how many of the same partners that helped to create the Forestry BMP Program were at the table today and that we need continued assistance from all of our partners in planning and monitoring BMPs. Gene stressed the importance of keeping the BMPs voluntary in Wisconsin. Gene also explained our hope that the Advisory Committee can address the major issues before it by February or March, so that monitoring can take place in the fall of 2002. Gene concluded his remarks by talking about the draft charge and that the final version of the charge will be decided by this committee.

Housekeeping, Rules, and Roles

John Duplissis, the UW-Extension Basin Educator for Central Wisconsin, introduced himself and explained his role as the facilitator for the BMP Advisory Committee Meetings. John talked about the methods we would use at the meetings, such as using the "Idea Parking Lot" and writing down key ideas and points on a flip chart. John also briefly discussed the meeting rules, including the importance of everyone contributing to the discussion and no one monopolizing the discussion. Dale Gasser, DNR, explained that lunches at the meetings are provided by DNR and that DNR will reimburse Advisory Committee Members for their mileage to the meetings if they desire.

Review draft Charge of the Advisory Committee

Darrell Zastrow, DNR, introduced this topic by explaining the need to proceed with a statewide BMP monitoring effort. Partners have identified BMP practices that need to be updated and there has been talk within DNR about on the ground efforts. A comparison of BMP monitoring methods with adjacent states may help us recognize the need for changes or additions to the current BMPs. Discussion began on editing the draft charge. The current version of our draft charge, as it read at the end of the meeting, is:

To revise Wisconsin's statewide monitoring strategy and methods for Forestry Best Management Practices for water quality monitoring (begin implementation in 2002). To develop a procedure for identifying and updating best management practices that need revision. Communicate BMPs and adaptations through education and outreach strategies.

- ✓ **Assignment:** If anyone has suggested changes, please email to Darrell Zastrow at zastrd@dnr.state.wi.us. We will review this as an agenda item on January 31.

Jim Baumann, DNR, talked about the federal perspective on our BMPs. In the early 1990's, citizens in Wisconsin voiced concern about forestry practices impacting nearby water bodies. A decision was made to develop a statewide program that would meet EPA's review. The BMP Field Manual was developed and it was reviewed and accepted by EPA.

Concerns were expressed regarding the implementation of BMPs by their various users. Private landowners have the lowest compliance rates and are not being actively informed about the BMPs. The need for private landowner BMP training was discussed. Since the BMP program began, over 25,000 copies of the BMP Field Manual have been distributed but there are over 260,000 private landowners in Wisconsin. It was also noted that loggers need more specific explanations for some of the BMPs. Consulting foresters need to follow through on timber sales to see that BMPs are implemented.

BMP Monitoring and Methods Used, 1995-Present

Dale Gasser gave an overview of the statewide BMP monitoring that was conducted from 1995-1997. During this period, 295 timber sales were monitored, most of which were north of Hwy 29. This is not representative of the distribution of private non-industrial lands in the state. The reason for this discrepancy is that timber sales for private non-industrial lands were selected from county cutting notices and the DNR tax law database. Many of the southern counties do not enforce the cutting notice requirement and few, if any have electronic records of cutting notices.

In 1999, monitoring work began in the Kickapoo River Watershed in southwest Wisconsin. This work, which focused on private non-industrial landowners, was funded by a Watershed and Clean Water Grant from the US Forest Service. Locating timber sales proved to be very difficult and time consuming. For locating timber sales in 2000, we used a DNR airplane to survey the landscape during leaf-off conditions. This proved to be an excellent way to locate recent harvesting activity.

In 2000, we expanded our monitoring effort to include the entire driftless area of southwest Wisconsin (essentially the counties of Grant, Lafayette, Iowa, Crawford, Richland, Sauk, Vernon, Monroe, La Crosse, Jackson, Trempealeau, and Buffalo). Our flights located about 380 recent harvesting sites but we only had enough staff time to confirm about 125 timber sales. BMP monitoring was conducted on 19 of these sites.

In 2001, the final round of monitoring was conducted in the Kickapoo River Watershed. We located 40 sites from the aerial survey, which translated into 34 confirmed timber sales. BMP monitoring was conducted on seven of these sales.

Overall, our monitoring results were fairly consistent with those from the 1995-1997 statewide monitoring. Staff are currently working on a 2000-2001 monitoring report. During our work in southwest Wisconsin, less than 10% of the private landowners we contacted denied us access to their property (as compared to 29% during the 1995-1997 monitoring). Visits with the local County Clerk Offices' revealed that, on average, about 25% of private landowners are filing cutting notices.

Budget for Monitoring

Dale discussed the two funding sources we currently have. The first is a section 319 (Clean Water Act) grant from EPA, which the DNR Bureau of Watershed Management has been providing us with since the BMP program was created. We receive \$30,000 per federal fiscal year (i.e. October 1, 2001 to September 30, 2002) and this pays for a half-time limited-term employee (LTE), monitoring, and BMP education and training workshops. In the new 2001-2003 state budget, we receive an additional \$45,000 per state fiscal year (i.e. July 1, 2001 to June 30, 2002) for base operations and monitoring. We also received an additional \$6,000 for private landowner BMP education. The cost for doing statewide BMP monitoring during 1995-1997 was in the range of \$25,000 to \$30,000 per year.

Begin Discussion on Frequency and Intensity of New BMP Monitoring

Jolene presented information on four alternatives to BMP monitoring. The first option is a statewide approach. Options Two and Three would target 4-year monitoring efforts. Option Two utilizes counties and regions as boundaries of the monitoring efforts. Option Three targets essentially an even distribution of total forested area divided by year cycle. Option Four targets a 3-year monitoring effort, again based on a relatively even distribution of total forested area.

A discussion followed regarding issues related to monitoring, such as DNR staff availability and areas of the state that may need heavier monitoring. Suggestions as to alternative ways of monitoring were presented, such as targeting geographic management unit (GMU) basins, landtype associations (LTAs), or priority watersheds rather than county groupings. Another option is to conduct a lower intensity statewide monitoring followed by focused attention within a region of concern or at risk. Foremost we need to identify why we are monitoring and from there we can target the monitoring to meet those objectives. The objectives identified were: to identify trends associated with BMPs, to obtain feedback on the implementation and percent compliance of BMPs, to obtain uniformity. Overall, we are doing this to ensure that we have good water quality.

Work items were discussed. There is a need to work with a statistician to ensure statistical significance with whichever monitoring method we choose. Hydrologic areas within the state need to be evaluated to determine areas of greater risk and identification of locations where more water features occur. Methods and costs also need to be determined.

✓ **Assignment: DNR staff will distribute refined alternatives in advance of the next meeting.**

BMP Monitoring Methods

Dale discussed a few more points of interest, such as the need for a revision of the Audit Worksheets, the National BMP research symposium in April, and the consistency of BMP monitoring especially with neighboring states.

The schedule for future meetings are as follows:

January 31st, same location and time

February 27th, same location and time

March 26th

Parking Lot from December 17, 2001

Application of procedures:

- Professional education (Cooperating Forester's Agreement)
- Landowner information

Logger training and compliance

BMPs based on land type?

Site level effects/land-use planning

Classification (wetlands)

Incentives for compliance

draft

BMP Advisory Committee Meeting Notes from February 27, 2002

Committee Members Present:

Matt Dallman, The Nature Conservancy; Mike Gehrke (for Nancy Livingston), Wis. Woodland Owners Association; John Grosman, 1000 Friends of Wis.; Dan Kretz, Lake States Lumber Association; Don Last, 1000 Friends of Wis.; Colette Matthews, Wis. County Forests Association; Mary Platner, Wis. Association of Lakes; Bob Rogers, Society of American Foresters; Fred Souba, Stora Enso; Earl Gustafson, Wis. Paper Council; and Dave Stoiber, International Paper.

Staff Present:

John DuPlissis, UWEX; Dale Gasser, DNR; Julie Scharm, DNR; and Darrell Zastrow, DNR

Others Present:

Al Todd, Watershed Program Leader, USDA Forest Service, Northeastern Area State and Private Forestry

Welcome and Introductions

John DuPlissis began the meeting by asking the attendees to introduce themselves.

Review Meeting Notes from January 31, 2002

There were no modifications or changes to the content or format of the January meeting notes.

Review Draft Charge of the Advisory Committee

The current draft charge was reviewed and accepted as presented in the January 31 meeting notes. The Charge of the BMP Advisory Committee is:

In order for Wisconsin to implement BMP monitoring in 2002 and beyond we will:

- Consider revising Wisconsin's statewide monitoring strategy for Forestry Best Management Practices for water quality monitoring.
- Develop a procedure for identifying and updating best management practices that need revision.
- Develop a procedure for communicating BMPs and adaptations through education and outreach strategies.

Review and Discussion of Our Current Monitoring Worksheet

John led off this topic by asking the Advisory Committee how we want to proceed on revising the current monitoring worksheet. The three possible roles of the group are: brainstorm and work through the worksheet today; break out a smaller group to work on it as an ad hoc committee; DNR to revise it according to comments from this group. The preference of the group was the third option, for DNR to revise the worksheet based on comments from the group.

General comments: •Does the DNR already have comments that have shaped this? •Why does monitoring takes place in September and October? •Monitoring worksheet looks complete. Allow for more specifics in comment area. •Make sure forestry terminology is understood. •Input from monitoring team members on possible improvements. •Have monitoring team leaders check in with the advisory committee after the 2002 monitoring is completed. •Is information updated and specific enough?

- ✓ **Assignment: DNR staff will compile previous comments and revisions to the monitoring worksheet and send them out to the committee along with the current draft of the monitoring**

worksheet. Committee members will review these documents and send their comments to DNR by March 21. At the March 26 meeting, DNR will distribute the revised worksheets along with the comments received.

Regional Perspective on BMP Monitoring and Methods - Al Todd

“Burden of Proof: Monitoring Timber Harvest BMPs”

Why does anyone care? Silviculture identified as minor source of nonpoint source (NPS) pollution. Impacts are limited in spatial and temporal effect. Simple cost-effective BMPs shown to be effective. Because water will be a preeminent issue in the future, forestry is included. Only 0.008% of the world's water supply is renewable fresh water, a finite supply. Many watersheds are currently in poor condition. Watersheds in need of remedial treatment in northeastern area 80%, nationwide 68.4%. About 60% of population using surface water as municipal water source. Forests are important to people: improve quality of life, recreation and spiritual renewal, cool communities, beauty, refuges for wildlife, etc. Top issues for citizen and watershed organizations are: protect drinking water supplies, conserving rivers and streams, urban sprawl, effects of floods, wildlife habitat, open space, and fisheries.

People turn toward regulation to protect things they deem valuable. To answer initial statements: studies still show that erosion and sedimentation does occur on significant proportion of logging jobs. There are moderate localized impacts or impacts may occur at critical times of year or in critical areas-drinking water supplies. States repeatedly report a serious lack of monitoring data

Monitoring: Did we do it? And did it work? Monitoring provides feedback mechanism.

Compliance: Did we do it? Most often monitoring focuses on individual BMP use, installation technique, performance. Failure to install a BMP may or may not be considered noncompliance. In most states, complaints are still the primary method for detecting BMP failure.

Effectiveness: Did it work? Problem identification BMP compliance studies help assess the relative value of BMP used. Scientific watershed studies of pre and post harvest using paired watersheds.

In the 20-state northeastern area, all states have adopted some BMP guidance, combination of voluntary (12) and regulatory (8), 4 states have bad actor provisions, 4 states working on having certification of loggers, compliance/implementation monitoring inconsistent, anecdotal, or non-existent, and all have training and education programs.

What do the states say? No funds or staff for monitoring. Job is too enormous (over 40,000 logger/landowners per year involved in New England and Mid-Atlantic States, Birch 1994). If done, effort is irregular and intermittent. Can meet priority needs but realize they are not reaching many landowners and loggers. Monitoring data is not always comparable year to year. No consistency across states due to variations in practices. Fear of being compared.

Regular periodic field compliance is important. What does EPA want? Reasonable assurance of compliance: regular assessment, technical quantitative data, comparability, access to information, ability to utilize in TMDL or other regulatory framework.

A BMP Monitoring Protocol for Timber Harvest Operations

Project leads: Roger Ryder, Maine Forest Service & Dave Welsch, USFS Northeastern Area

Strategy: document degree of compliance with Clean Water Act, Coastal Zone Management Act, and state laws. Identifies opportunities for improved water resources protection and training needs. More cost effective than in-stream monitoring. Certifies environmental protection.

Common protocol: simple but unique approach. Based on principles of water resource protection. Monitors effectiveness of a package of BMPs, not the installation of individual practices.

Local benefits: maintains state control of BMP specifications, sample design and selection, monitoring team, and quality control procedures. Allows operator selection of appropriate BMPs based on site conditions.

Focus on principles of water resource protection: 1. Planning; 2. Control of water flow; 3. Soil stabilization; 4. Hazardous material control and disposal; 5. Undesirable contribution to water body (slash, trash, etc.); 6. Social influences. Measurement of effectiveness is increased by focusing on the areas and activities having the greatest potential to impact water quality. Sampling units to be monitored: riparian areas and wetland, water crossings, adjacent areas identified as existing risk, future risk, or presently impacting water resources. Activities to be monitored: haul road construction, drainage, and maintenance, harvesting, and skidding/forwarding. Data collection: GPS unit with data dictionary. Geo-referenced monitoring so can assemble and interpret data. Monitoring social influences: landownership category, logger/landowner training, harvesting plan, contract addresses and harvesting procedure, harvesting supervised by forester, voluntary or mandatory. Index ratings: Assess existing and potential harvest impact: site rating, current harvest impact rating, composite risk rating, quantify impacts.

Project Deliverables: Monitoring protocol and process. Data entry program and data dictionary. Field testing. Monitoring training. Risk ratings. Centralized data base structure. Analysis by user defined land unit. Computer generated reports. Phase 1: Pilot test: committed pilot states. Variety of topography etc. randomly select harvest sampling site. Participation in training and project review.

Next Steps: spring 2002 EPA field review. NASF Water Resource Committee Review. 2002 field-testing. Additional funding sources for final analysis and training. Phase 2: Revise procedures and expand index utility.

Questions and comments: Will sampling only close to riparian areas make people dismissive of BMPs in non-riparian zones? If problem never makes it to riparian zone, then not violating water quality. If it will affect, it will make its way via water or will pass through riparian zone and then be monitored.

Data in problem areas may skew final results toward the negative? Doesn't represent whole land area? This is monitoring of BMP compliance, it measures the outcome of what happened on site. Compliance results will be lower using this process, but problem areas will be well defined.

Statewide Monitoring: Quality Improvements

Dale introduced this topic. The presentation by Al Todd is very relevant to Wisconsin. We could try to incorporate hand-held GPS units in the 2002 monitoring. This would be beneficial for reporting purposes and for sites that have followup monitoring/work done. Having electronic worksheets to use when monitoring sites is less of a priority.

In regard to statewide monitoring, it appears that the group is headed in the direction of continuous process improvement and clarification, as opposed to reengineering. This is reflected by the changes made to date in the monitoring worksheet. One significant change made to the current worksheet draft was to expand the questions relating to skid trails, as previously most of the road planning, construction, and maintenance questions pertained only to haul roads and not skid trails. Other minor changes have been made to make the form more user-friendly.

Procedure for Identifying and Updating BMPs That Need Revision

John introduced this topic by laying out three ways the advisory committee could handle this issue: committee revises as a group; form smaller ad hoc committee; or have brainstorm process and then have DNR draft and present. Choice is for DNR to develop draft process that will be evaluated by committee.

Discussion ensued on the draft handout entitled "Process for Updating BMPs". Much of the discussion dealt with defining what was meant by 'public', the type of role the advisory committee should have, and the role of monitoring teams.

- ✓ **Assignment:** DNR staff will revise the draft process for updating BMPs that will be evaluated and discussed by the Advisory Committee.
- ✓ **Completed:** The new draft language appears below. New language and deletions, as compared to the January 31 handout, are represented by underlines and strike-outs. Please send any comments on this new draft to Dale Gasser at gassed@dnr.state.wi.us. We will review this as an agenda item on March 26.

Process for Updating BMPs

The Division of Forestry, in partnership with the BMP Advisory Committee, is responsible for conducting and completing an BMP updating process.

Step 1. Solicit ~~public~~ input from practitioners, landowners, and other interested groups (foresters, loggers, ~~landowner~~managers, etc.) on BMPs that need updating. The BMP Advisory Committee will solicit input from represented constituencies. Suggest ~~they~~ comments specify why the BMP is a concern and in need of updating. (Solicit input via technical forums, training sessions, letters to individuals, etc.)

Step 2. Summarize ~~public~~ input; request experts for a review of existing BMPs; provide summary of input gathered in Step 1 to experts to focus review. Request experts in their review to specifically identify:

- Potential training and education needs.
- Potential research needs.
- BMPs to explore further on the need to update, modify or improve.

Experts produce reports and/or analysis of review findings and ~~then~~ recommend priority needs.

Step 3. BMP Advisory Committee evaluates experts' ~~Based on~~ recommendations and confirms the following:

- a.) ~~Identify~~ Potential training and education needs ~~or~~.
- b.) ~~Identify~~ Potential research needs ~~or~~.
- c.) ~~Identify~~ BMPs to explore further on the need to update, modify or improve.

Step 4. For those BMPs that are identified in Step 3.c. above, initiate the process to update, modify, or improve following public input and further analysis:

- a.) Provide general public information ~~Notification of BMP(s) proposed BMP for revision/update—public notice.~~
- b.) Assemble team of experts and practitioners and have team draft the updates. (Experts to be drawn from sources such as SAF, University, USFS, Forest industry, environmental groups, loggers, land managing agencies, etc.)
- c.) Public review and comment.

- d.) Consideration of public and expert input.
- e.) BMP Advisory Committee develops final report and recommendations to Chief State Forester.
- f.) Chief State Forester makes decision.
- g.) Formalize updates.

Step 5. Implement all BMPs (including those newly revised) and incorporate performance analysis into monitoring effort to determine why or why not BMPs are being implemented. Note: ongoing quantitative and qualitative analysis.

Identifying Monitoring Team Members for 2002

Dale discussed the request for a brief written description of the requirements and commitments for being on a 2002 monitoring team. At this point, we need the names of people willing to participate by our March meeting. People willing to participate will need to attend a two day training workshop in July, at which point they will meet the other members of their monitoring team and schedule the week that they will conduct monitoring in the fall. Once we have this pool of candidates, the team members will be selected based on how they fit on the teams (i.e. each team has positions for water quality, soils, logging, etc.). DNR will send letters to the people selected.

- ✓ **Assignment: DNR staff will send to the committee a description of the requirements and commitments for monitoring team candidates.**

Assistance Identifying Eligible Timber Sales for 2002

The task of identifying timber sales that are eligible for monitoring is easily the biggest workload associated with monitoring. Any assistance from members of the advisory committee would be very helpful. We specifically need assistance identifying private non-industrial and private industrial sales. This issue will be discussed again at the March meeting.

- ✓ **Assignment: DNR staff will send eligible timber sale criteria to the committee.**

Next Meeting

Tuesday March 26, same place, same time.

In addition to items noted above, the next meeting will focus on education and outreach strategies. Listed below is a summary of existing BMP education and outreach strategies.

Education and Outreach

Since 1995, the BMP program has held education and training workshops, primarily for loggers and foresters. Since about 1997, these workshops have been provided by FISTA. A number of BMP training workshops for private landowners and more general landowner workshops that include other topics have been held by DNR, WWOA, UW-Extension Basin Educators, The Woodland School, SAF, and other groups. The Division of Forestry received some limited funding in the current state budget and will be holding three or four additional workshops yet this fiscal year.

Parking Lot from February 27, 2002

Time of year for monitoring

Evaluation procedure -process for change based on practice

**BMP Advisory Committee
Meeting Notes from March 26, 2002**

Committee Members Present:

Ed Brandis (Timber Producers Assn.), Mike Gehrke (WWOA), John Grosman (1000 Friends of Wis.), Don Last (1000 Friends of Wis.), Mary Platner (Wis. Association of Lakes), Mike Prouty (USFS), Bob Rogers (SAF), Fred Souba (Stora Enso)

Staff Present:

John DuPlissis, Dale Gasser, Pat Murphy, Jolene Willert, Darrell Zastrow

Opening Remarks

John DuPlissis started the meeting off with introductions and general comments as to the structure of the day's meeting. He reminded the committee that the majority of the topics presented today are to be finalized.

Comments on Meeting Notes from February 27

A suggestion was made to reword Step 2 of the process for updating BMPs: "...request experts to conduct a review..."

Final Comments on Monitoring Worksheet

Dale Gasser passed out copies of the current Monitoring Worksheet that incorporates Committee members' comments. Changes were made to make the form more user-friendly. Content cannot be changed at this point as it reflects the BMP Field Manual. Notice was made to #35 in the Forest Roads section to change "per-manent" to permanent. Any additional comments need to be submitted by June.

Finalize Process for Updating BMPs

Copies of the latest draft Process were distributed. The Advisory Committee has a continuing role in this process (Step 3). No additional comments were made as to changes to be made to the draft. Perhaps Quality Control issues could be added here.

2002 Monitoring Team Members

Dale requested Committee members to keep submitting names if possible. The process of filling team leader positions is underway. An effort will be made to share the workload so that the team leaders do not become overburdened. We're looking for 8 teams with 5 people on a team to monitor approximately 90 timber sales. BMP training workshops to be scheduled in July. Monitoring to occur late summer, depending on what works best for individual teams. A suggestion was made to develop a way to calibrate the monitoring teams so that there is similarity between methodologies of the teams...perhaps having each team monitor the same trial field site to see if ratings are similar. Perhaps have one experienced person to act as a "coach" to all the teams (Dale?). The two issues are training and follow-up (re-enforcement of what was learned in the training session). There may be a need for one person to go to for final decisions if there are questions or disagreements within teams. Dave Roberts (NRCS) is a possible contact person to get input as how to go about this calibration and follow-up process.

There may need to be more than one coach if teams are monitoring at the same time. Coaches would ideally be present very early on in the monitoring process. Perhaps the team leaders could be developed as coaches. Quality control may be more needed at the qualitative level: what is navigable? What defines a wetland? Assignment: Create a write-up on these quality control issues.

Environmental/conservation organizations may be the most difficult category from which to get monitoring team members. Suggestions was made to include members of tribal organizations, deer hunter organizations, members of organizations like Trout Unlimited.

Satellite Imagery Update – Jolene presented information on the contracted pilot satellite imagery project. Initial review of ForestOne (private contractor) accuracy of "change in vegetation" locations for current timber sales do not appear to be very accurate. DNR will be meeting with ForestOne in early April to

discuss accuracy concerns. Using satellite imagery may not be a viable alternative at this time unless a greater # of current timber sales can be identified.

Identifying Eligible Timber Sales

Identifying sales will stem from the 6 land ownership categories: county, state, federal, tribal, NIPF, and industry. NIPF landowners is the largest category and will be the most work intensive. Options are satellite imagery (being looked into, but probably not an option for this year), aerial photo interpretation (time consuming and expensive), aerial surveys (will begin in select counties soon), cutting notices (better option for northern counties).

Dale described the process of locating and identifying timber sales via aerial surveys. Who will do the ground work? Is this feasible for county foresters considering time of year and workload? Fred Souba volunteered to send out a letter to industry asking for participants (he would like a letter drafted for him). Emphasis was placed on this needing to be a voluntary process. Suggestion: Look at areas of historically low compliance more closely...however, does this introduce bias? Check with NRCS as to which portions of the counties they survey. Concerns were expressed over bias created in this timber sale selection process. Ideally we would have a consistent methodology. We may need to begin working with Counties to develop a way to have higher compliance with filing cutting notices...this may be an education issue and will also mean making this an easy process for County Clerks (perhaps create an electronic format). Dale will be attending a BMP conference in Atlanta and will be able to see other states' methodologies for identifying timber sales.

Clarification was made as to how various landowner sales would be stratified – the percent of landowner types will be reflected in monitored sites. Creating an environment that involves landowners into participating would be ideal. A suggestion was made to work with the Self-Help Monitoring Program to ask them to help identify timber sales around water features...could be easily made into an electronic filing process. A possible contact person is Jeff Bode. Assignment: DNR check with Self Help Monitoring Program contacts to determine if

Education and Training Strategies

Jolene presented information on the past training efforts.

- 1) Past Strategies – BMP Education and Training Committee (see handout)
- 2) Current Strategies (see handout) – implemented by DNR, FISTA, WI Productivity Council, RC&D, and UW-Extension.
- 3) Future Strategies (see handout)

Fred provided clarification that under the category of **Current Strategies** the training elements of BMP's is not part of the certification efforts, rather it is a training standard that is required under SFI. Fred offered to provide comments and corrections to this information. **Assignment: The Advisory Team should make corrections to these Strategies by April 9th and send them to DNR.**

Generally the group agreed that the current

Messages:

Core Curriculum:

- The effect of forest management on water quality
- Big picture concerns (impact on watershed) as well as site specific (impact on stream)
- This core curriculum would be similar to the various groups identified in the chart including the landowner, loggers, professional foresters and industry.
- Audience and specific message may vary with groups.
- What do we want the various groups to know and what do we want each of these groups to do.
- Landowners – NIPF – ought to be working with NRCS and include the concerns about other land management practices such as those agricultural land uses.
- Buffer zones – scientific basis for the value of a buffer zone.
- Forester /logger implementation.
- Industry – what do we want them to know - -what do they want them to do.

- Industry should be targeted at the landowner level – not the category level.
- Audience types not identified – need to include general public, other natural resource professionals (i.e. NRCS) other environmental or conservation organizations. Outreach is really important to compliment education.
- Loggers – statewide training is done well but there are pockets of loggers that do not participate. Refreshers in training are helpful. Proper identification of BMP concern areas in timber sale establishment could be enhanced, for example, identification of a stream, etc.
- Core curriculum is fine. Where do we need to improve? New research and monitoring concerns would be the areas that additional outreach and education efforts should target.
- Landowners (NIPF) are the group that does not have enough focused training.
- WI Public Radio – Larry Mailer opportunity for public radio.
- Do we have a database that attempts to define the # of landowner that have significant water resources potentially impacted?
- NIPF focus on simple message and mechanisms (i.e. brochures) concerning water quality.
- Reach out to under-served groups – go to where these people are – community events, etc.
- Placemats – restaurants with key water quality messages targeting local landowners.
- What is the value of good management?
- Points of entry – where are the springboards? Tax bills – town treasurer’s incorporate brochure into the tax bill. Possibly utilize the 4H groups to facilitate sharing brochures and incorporate into their programs on behalf of rural leadership efforts. K-12 curriculum/education.
- Website expansion. Possibly develop a canned PowerPoint presentation for the Web.
- Send brochures to folks that submit cutting notices.
- Agriculture programs. NFCS, FSCA, etc.
- WEEB- Connect Sterling or Dennis Yockers
- Change the perspective or ethic of “owner” to “steward”
- Possibly shift from education to more outreach efforts.
- Window of opportunity with tree sales – brochure ready to go at this time could be given out with distribution of trees. Website would need to be clearly identified on the brochure for more information. One pager seems to be a very effective tool to reach people.
- Don’t re-invent the curriculum since the basic efforts are well received. Outreach is a very appropriate new horizon. \$ should be spent on the whole population rather than just a few of the interested.
- Displays – go where the people are. Will other people be willing to share the message.
- Oct 21-22 Monona Terrace – Wisconsin Academy of Sciences Arts and Letters – display opportunity
Contacts: Pat Leavenworth and Stu Bourne (spp.?) and Curt Meine
- A “communications plan” should be developed. We will need to write this up internally DNR.
- Keep our message positive on the water quality opportunities with BMP’s.
- Performance based, quality improvement, develop processes that develop outcomes. Continuing education efforts. Somehow we need to instill in the ranks of leaders the ability to lead on these types of issues. Leadership academies, institutes, etc.

Future Advisory Committee Needs

After field work and a certain level of data has been organized, Advisory Committee input is needed.
Wednesday, December 4th – Wausau.

Darrell extended thanks to the Committee members from Gene. Thanks to the Advisory Committee from Darrell, Dale, and Jolene. Let us know if you have additional needs or questions. Thanks to John for facilitating the meetings.

BMP Advisory Committee Meeting
Wednesday, December 4, 2002
Hereford & Hops Restaurant, Wausau

Committee Members Present:

Ed Brandis, Timber Producers Association; Matt Dallman, The Nature Conservancy; Mike Gehrke, WWOA; Dan Kretz, Lake States Lumber Association; Donald Peterson, Wisconsin Professional Logger's Association; Mary Platner, Wisconsin Association of Lakes; Bob Rogers SAF; Gene Schmit, Wisconsin County Forest Association; Fred Souba, Stora Enso; Dave Stoiber, International Paper.

Staff Present:

Brian Breunig, DNR; John DuPlissis, UWEX; Dale Gasser, DNR; Kyle Holland, DNR; Darrell Zastrow, DNR

Welcome and Introductions

John DuPlissis began the meeting by asking everyone to introduce themselves. This was followed by a review of the agenda.

Charge of the Advisory Committee

Dale reviewed the three parts of the Committee's Charge that was established at our previous meetings. The objectives for BMP monitoring were also reviewed. Darrell added that the key purpose of this Committee is to provide feedback to DNR Forestry and to allow partners to voice their questions and concerns.

2002 Monitoring Strategy and Preliminary Results

Dale described the major steps that took place before the actual field monitoring was conducted. On July 30-31, a BMP training workshop was held at UW-Stevens Point for all eight of the 2002 monitoring teams. The first day consisted of classroom and field training. On the second day, each team monitored two timber sales, after which all of the teams went through their monitoring worksheets together. Dale noted that recruitment and retention of monitoring team members was difficult, as at least ten people who initially committed backed out in the two weeks leading up to the workshop.

Dale then described the methods used for the random selection of timber sales. Obtaining the list of all timber sales on federal, state, county and private industrial land was relatively straightforward. Only three tribes (Menominee, Stockbridge-Munsee and Forest County Potawatomi) agreed to participate in our monitoring effort. For these five groups of landowners, the timber sales were put in random order and then we contacted their respective foresters to confirm the eligibility status of the selected sales.

The process for identifying timber sales on private non-industrial (NIPF) lands was much more complicated. We used three methods to obtain this information. First, the Chapter 26 cutting notices were counted from every county and entered into a spreadsheet. Then, the DNR taxlaw database was queried for MFL and FCL timber sales, which were also entered into the spreadsheet. Finally, aerial surveys were conducted of eleven randomly selected counties in the

southern half of the state. These three methods yielded approximately 7,500 NIPF timber sales. The timber sales in this spreadsheet were then put in a random order, and we selected the top 350 from the list for field checking. Central office staff (Dale, Brian, and Kyle) conducted the majority of NIPF field checks. The assistance from DNR field staff with field checking and pre-screening was extremely valuable but limited due to competing workloads. Of all the NIPF timber sales that were field checked, only 18% were eligible for monitoring.

Dale reviewed the all of the people who participated on the monitoring teams and when each team did their fieldwork. Central office staff accompanied each team on their first day. The eight teams monitored a total of 85 timber sales. The results from the 2002 monitoring are preliminary and more definitive results will be presented at the next meeting of the Advisory Committee.

Questions from the Committee included:

- Are roads outside the sale boundary evaluated? *Answer: yes, if constructed or reconstructed for the timber sale. If an existing road is used, maintenance practices are still applicable.*
- What was the lowest score for a sale and what did it look like? *Answer: Brian and Kyle thought the lowest score was “3 of 10”, but were unaware of site details*
- How can we improve the 18% success rate of finding eligible NIPF sales? *Answer: Provide the field staff with sales earlier in the season and rely more on pre-screening. However, Darrell pointed toward the need to keep randomness in the monitoring and that may be a significant reason for the relatively low success rate of 18%.*

The “2002 Monitoring Guidelines” will be sent out electronically with these meeting notes.

2002 Monitoring Costs

Dale explained that all of the costs related to the 2002 monitoring are still not in. Costs have been broken into five categories:

1. Aerial Flights (this method will not be used again for statewide monitoring)
2. Cutting Notices (the routing and retention of these notices varies from county to county and a more consistent method may be beneficial to the needs of the BMP program and others)
3. BMP Workshop (if monitoring is done in 2003, then the workshop could potentially be shortened since some team members from 2002 would likely be involved again)
4. Field Checks (costs for lodging, meals, and mileage for central office staff to field check sites statewide)
5. Monitoring Teams (costs for stipends, lodging, meals, mileage, and time)

Total costs and hours (and cost and hours per site) will be provided at the next meeting. Darrell added that we must also note the hours spent by partners that were involved. Dan stated that the money spent on the satellite imagery pilot should be included in 2002 costs.

Regional BMP Monitoring Protocol

Dale coordinated a meeting in Mosinee on October 16-17 with staff from the US Forest Service-Northeastern Area (State and Private Forestry) and the State of Maine. These two partners are developing a regional approach to BMP monitoring. This is the same project that Al Todd

(Watershed Program Leader for the Northeastern Area) spoke to us about at our February meeting. Wisconsin was one of ten states in the Northeastern Area that participated in trying this new method on a handful of sites. This method focuses almost exclusively on the water resources present on a timber sale. The evaluation of stream crossings under this system is much more thorough than our method. The regional method also does a better job of quantifying impacts to water resources.

In May 2003, there will be a meeting out east of the ten pilot states to discuss results and refinements to the system. In the fall of 2003, their goal is to use the regional BMP monitoring protocol on a full scale in two or three states.

Lessons Learned

- At this time, satellite imagery is not a viable method for locating timber sales.
- Aerial surveys for locating timber sales are not cost-effective for a statewide effort. It may be useful for localized or regional monitoring.
- Incorporating the use of GPS units by monitoring teams is valuable.
- The GPS tracks for each timber sale will be beneficial if a site is re-audited.
- In future efforts, staff could use GPS units on field checks so the monitoring team could have a very accurate map of where they need to go.
- Cutting notices still appear to be the best source for finding eligible sales.
- Time crunch brought problems such as teams traveling long distances, insufficient maps, and weather problems (an earlier start in 2003 could alleviate many of these problems).
- Recruiting monitoring team members through the DNR web site looks promising

Feedback from Monitoring Team Leaders

According to the team leaders, positive aspects of the 2002 monitoring were:

- Teams were very diversified and worked well together.
- Not having to contact landowners or conduct field checks helped the team leaders.

Suggested changes for future monitoring included:

- Form is too long and sometimes confusing (form will always be debatable and no states have the answer for a completely clear and concise form).
- Questionable eligibility at some sites (could be remedied by explaining criteria to field staff more clearly, especially the eligibility criteria regarding wetlands).

Feedback from Advisory Committee members that participated on a 2002 monitoring team:

- Dave mentioned that all the sites that his team visited were certainly applicable to BMP monitoring, but stated that the wet weather caused the form to be become difficult to use.
- Mary added that some of her team's sales did not seem to be applicable since each did not have a definite water source, and also said that the cause of rutting at one site was difficult to determine (logging versus ATV use).
- Ed stated that traveling together as a team was extremely helpful since the team could discuss a site and complete the worksheet on the way to their next site.
- Mary commented on how having a logger or forester on each team is invaluable.

The Committee had some additional discussion on potential changes. Matt wondered if spring monitoring would be more effective than fall. John reinforced the importance of setting the 2003 strategies early in the year. Industry should be made aware of the DNR's intent early in the process so that assistance is more available when needed. Fred asked if locating eligible sites could be contracted and, if so, if it is an option (he also stated that the overall coordination of the BMP effort should remain with the DNR).

Darrell thanked everyone for their participation on this Committee, the assistance that the DNR received from various partners, and thanked Dale for his work in accomplishing the 2002 monitoring. The Committee discussed the need for cutting notices to be taken seriously by landowners so that a notice is filed consistently and, therefore, further aid the random selection of field sites.

Reprinting of BMP Field Manual

The DNR warehouse ran out of BMP field manuals last spring. Since the last printing of these manuals in 1997, many statutes and administrative codes have been revised. The BMP field manual will be reprinted early in 2003 to update the changes that have taken place in the last five years. However, the practices themselves are not being updated. This information is being presented as a "heads up" to the Committee.

Plan for Future Meeting(s)

The 2002 BMP monitoring effort will be presented to the DNR Forestry Leadership Team in early February. Feedback from that presentation will be shared at the next Advisory Committee meeting. The 2003 Monitoring Strategy will be one of the main topics at the next meeting.

Fred suggested that the role, direction, and recommendations of the Advisory Committee should be included in the 2002 BMP Monitoring Report. Fred volunteered to work with Darrell and Dale to develop a draft outline of the Advisory Committee's work to date and its continuing role. Several people noted that education should remain an important topic for the Committee to address.

Next Committee Meeting

- Wednesday, February 12, 2003 (location TBA).
- Agenda items to include final results and costs of 2002 monitoring, education outreach, the continuing role of the Advisory Committee, and discussion on 2003 BMP strategy/direction.

BMP Advisory Committee Meeting
Wednesday, February 12, 2003
Best Western Midway Hotel, Wausau

Committee Members Present:

Ed Brandis, Timber Producers Association; Miles Benson, Governor's Council on Forestry; Matt Dallman, The Nature Conservancy; Mike Gehrke, WWOA; Dan Kretz, Lake States Lumber Association; Colette Matthews, Wisconsin County Forest Association; Mary Platner, Wisconsin Association of Lakes; Bob Rogers SAF; Fred Souba, Stora Enso; Curt Wester, Wisconsin Professional Logger's Association.

Staff Present:

Jim Baumann, DNR; John DuPlissis, UWEX; Dale Gasser, DNR; Kyle Holland, DNR; Darrell Zastrow, DNR

Welcome and Introductions

John DuPlissis began the meeting by asking everyone to introduce themselves. This was followed by a review of the agenda.

Review Meeting Notes from December 4, 2002

No comments or additions to the meeting notes.

Draft 2002 Monitoring Report: Results and Costs

Kyle began with an overview of the report, briefly explaining each section. Several graphs were displayed, important trends were identified, and statistical significance of several estimates was discussed. Important topics included:

- Comparison of the distribution of monitoring sites, 1995-1997 verses 2002 – more evenly distributed in 2002.
- Comparison of the distribution of application responses, 1995-1997 verses 2002 – higher percentage responses for correct application, reflected in the increased overall correct application rating.
- Trend of overall correct application appears to be increasing slightly since 1994. Trend in variation suggests that application is becoming more consistent about the 86% mean.
- Correct BMP application for the NIPF landowner category is statistically the same as the value presented in 1997.
- The only estimate for BMP application by landowner category that is statistically valid is for NIPF.
- Generally, application by BMP category appears to be increasing.
- 2002 estimates for *timber harvesting* and *skid trails* are hard to compare because both of these BMP categories were grouped together in the 1997 report.
- We are seeing a significant amount of long-term impact when BMPs are not applied.
- BMPs B5, B8, B9, and B6 appear to be problem BMPs. BMP education should focus more on these BMPs.
- Professional Judgment Ratings were used to inform landowners how their sale scored during monitoring. The distribution of Professional Judgment Ratings across the state is unique.

- Tax law (MFL/FCL) participants scored better during monitoring than non-tax law participants.
- Regarding the differences between the NIPF owners, it was noted that non-tax law owners could still participate in Tree Farm or have a management plan, or use professional assistance. Staff will see if we have enough information from the landowner survey to address these points.
- The total cost, including external partners' opportunity costs, for the project was \$172,559 or \$2,030 per site.

Draft Report Feedback and Discussion

Kyle led the discussion on the draft report. Darrell suggested a deadline of March 15 for getting comments on the 2002 monitoring report back to us.

Bob and Fred will work on writing the Forward and Acknowledgments sections in order to capture the role of the BMP Advisory Committee. Bob suggested that loggers need to receive recognition for the good work they are doing with implementing the BMPs. It was noted that the report should describe the ongoing FISTA BMP workshops. If possible, it would also be interesting to determine if there is any correlation between the 2002 monitoring results and the training history of the loggers involved in those sales.

Matt suggested that we add a "Measures of Success" section to the report, which was supported by several other members. We could possibly include data from FISTA into this section.

Fred suggested that we provide an update on all three parts of the committee's charge in the report, and that we should include the "Procedure for Updating BMPs" into the appendix. Matt added that we should clarify our second monitoring objective to reflect that we are using a qualitative approach for rating water quality impacts.

It was also suggested that a map be included, displaying the predominant water feature type on each site. In addition, Fred commented that the Professional Judgment Ratings section on the worksheet be labeled. Fred also noted that items be listed for each cost presented, footnoted appropriately.

Budget Impact Monitoring Strategy for 2003

Darrell gave the committee a summary of last week's (February 5th) Forest Leadership Team (FLT) meeting. Although the FLT focused on the costs incurred by DNR with the 2002 statewide monitoring, the FLT also acknowledged the significant costs incurred by our partners in this process. Based on the significant costs involved with statewide BMP monitoring, the FLT recommended that we look into the possibility of contracting out future monitoring efforts. For BMP monitoring in 2003, the FLT recommended that we monitor timber sales on state lands and county forest lands (about 30 sales from each group).

In terms of how our 2003 monitoring effort may be impacted by the current state fiscal crisis, it is too early at this time to know how budgets will be affected. Darrell stated that we would start to learn more about this after the Governor's Budget Address on February 18th.

Monitoring Options for 2003 - Review and Discussion

Dale presented four options for conducting 2003 BMP monitoring. Alternative 1 was to do a repeat of 2002 by monitoring at least 80 timber sales across all landownership groups. The estimated cost for this option was \$152,000 including opportunity costs (salary and fringe). Alternative 2 was to focus on state lands and county forests by monitoring 30 timber sales from each group. The estimated cost for this option was \$70,000 including opportunity costs (salary and fringe). Alternative 3 was to focus on federal forests and private industrial by monitoring 20 timber sales from each group. The estimated cost for this option was \$49,000 including opportunity costs (salary and fringe). Alternative 4 was to do no monitoring in 2003.

The Committee had considerable discussion on the various 2003 monitoring options. Much of the discussion was about the tradeoffs between using a regional approach (i.e. monitor all landowners in one-third of the state each year) and using a landowner approach (i.e. monitor specific landowner groups to achieve statistically relevant data each year). The outcome of this discussion was that the landowner approach would be less expensive and provide the best results. After three years of using this approach, regional data could also be inferred.

The Committee also discussed the FLT's recommendation that we consider using a contractor for future monitoring efforts in place of our multi-disciplinary teams. Fred suggested that DNR could continue using the current multi-disciplinary teams if they contracted out other workloads such as fire or MFL. Darrell noted how much success we had gaining access to private property in 2002 and questioned how this may change if a private contractor was making the NIPF contacts. Several people noted that we should check with other states to see what their experience has been with contracting out and what the potential pool of contractors available for this type of work is. Dan requested that staff work on obtaining estimates for the cost of contracting out.

BMP Education and Outreach

Dale presented an update on several BMP education efforts that are planned for 2003:

- FISTA has scheduled seven BMP education and training workshops for this year, and may schedule additional ones.
- There will be a BMP article in the June issue of the WWOA magazine.
- Planning has started on a private landowner field day, which will likely be held in Vernon County in late September. Southwest Badger RC&D is coordinating this workshop, which will focus on light-on-the-land harvesting options that are available to private landowners.
- Dale submitted a grant for a project in the Lake Superior Basin. This proposal is to hold an erosion control workshop for loggers and foresters. We would build some temporary stream crossings and showcase them at the workshop.

Prepare for Next Meeting

The committee discussed potential meeting dates and decided to hold the next meeting on June 18, at the Best Western Midway Hotel in Wausau.

**BMP Advisory Committee Meeting
Midway Best Western, Wausau
February 18, 2004 Meeting Notes**

Attending: Bob Rogers SAF, Colette Mathews Wisconsin County Forest Association, Mary Platner Wisconsin Association of Lakes, Ed Brandis Timber Producers Association, Curt Wester Wisconsin Professional Loggers Association, Marv Meier WWOA for Mike Gehrke, Al Koeppel for Dan Kretz of Lakes States Lumber Association, Dave Stoiber International Paper

Staff Present: Dale Gasser, Darrell Zastrow and Colleen Matula – Wisconsin DNR Forestry and John Duplissis UWEX

Report on County Monitoring

Discussion on statistical relevance of data collected. This sample was statistically relevant but difficult to compare to past data, which is not statistically significant due to small sample size.

Discussion on County results regarding extreme variance and apparent non-compliance regarding skid trails. Darrell will have Kyle look for outliers in data and find any causal factors in reports that might explain problem. Potential education effort to be determine pending investigation

Status of state lands Monitoring

Contract established with Northern Environmental Tech out of Park Falls, WI. Team of three (3) professionals at a minimum evaluating harvest sites including 1 forester; 1 hydrologist / soils expert; 1 logger. Approximately ½ of monitoring sites completed with interim report due by end of month. Contract completed and final report due by end of June, 2004

Discussion of Multi-disciplinary teams vs. Contracting

Brief discussion only. Several important points were raised. First, Darrell/Kyle will develop a complete cost analysis for the advisory Committee to consider. Second, contracting may not be appropriate for private lands. Private landowners may have a lack of trust and concerns over access to unknown third-party evaluators.

Hydrology Vacancy

Darrell announced that Dale had transferred to the South Central Regions fisheries operations program. The Committee thanked Dale for his service and offered its appreciation for all of his hard work. Darrell discussed potential workload distribution to cover Dale's absence. However, given current workload it was made clear that it would be difficult to cover all responsibilities related to a full monitoring program this year. Timeline for hiring was discussed expectations for start date ranged from July / August.

Monitoring Plans for 2004

On hold until it is determined whether workload can be distributed or a new hydrologist can be hired.

BMP Updates

General discussion by group. Issues were raised by Committee members regarding specific BMP's. DuPlissis suggested to the Committee that, given the current hiring process, Committee members seek input from the organizations they represent for changes to the BMP's. Darrell reviewed the BMP update process and discussed how this recommendation would fit into that process. Committee members will submit recommendations for possible changes to Darrell by June 26th. DNR will collate and redistribute to Committee for errors and omissions. Recommendations from the Committee to talk with Wisconsin Wetlands Association to determine interest in the Advisory Committee and add member if appropriate

Update on regional protocol

Dale and Darrell presented information on regional protocol. There was some discussion regarding the fact that the protocols are not a change to existing BMP's but rather how effectiveness is measured. Protocols attempt to quantify impacts rather than collect qualitative data, which is our current methodology. The Committee supports continued participation in the trials and the development of more quantitative measures.

State Forest Certification

Darrell provided information from the Forest Certification Evaluation. Most significant minor corrective action noted was logging roads on state forest land. Problem surrounding the closure of logging roads. Problem with recreationist demanding roads be left open. Current DNR BMP standard is to allow seasonal use however; year-round use is causing excessive siltation in some areas making this a cause for concern.

Silvicultural Exemptions for Wetlands

Brief discussions of abuses related to alleged silvicultural exemptions and corrective actions being taken in neighboring states.

Plan for next meeting

Next meeting will be held in connection with the Logging Congress in Green Bay. Morning of Thursday, September 9th.

Work items for staff include

- Darrell will have Kyle look for outliers in data and find any causal factors in reports that might explain problem. Potential education effort to be determine pending investigation
- Prepare report on state lands monitoring
- Prepare cost analysis on multi-disciplinary teams vs. contracting including recommendations for Committee to consider
- Collate recommendations for BMP updates from Committee
- Options and recommendations for future monitoring for Committee consideration.

Future agenda items

- **Hydrology Vacancy**
- **Report on County Monitoring – Skid trails**
- **Report on 2003 state lands Monitoring**
- **Discussion of Multi-disciplinary teams vs. Contracting**
- **Monitoring Plans for 2005**
- **BMP Updates**
- **Update on regional protocol**
- **State Forest Certification**